RTP ONDEMAND

Current and Future Role of PARP Inhibitors in the Management of Ovarian Cancer (Video Program)

CME Information

TARGET AUDIENCE

This activity is intended for medical oncologists and other healthcare providers involved in the treatment of ovarian cancer (OC).

OVERVIEW OF ACTIVITY

The American Cancer Society estimates that in 2016, 22,280 new cases of OC will be diagnosed in the United States and 14,240 individuals will die of the disease. Among all malignant ovarian neoplasms, epithelial OC is the most common form, representing approximately 90% of all cases. Primarily comprising serous, endometrioid and mucinous cystadenocarcinoma histologies, epithelial OC is the country's fifth most common cause of cancer mortality in women. For this reason significant resources have been invested over the past few decades in attempts to better understand the natural history of the disease, identify genetic and other factors responsible for its proliferation and develop novel therapies with the potential to significantly improve outcomes for patients. One such avenue, investigating PARP inhibition as a mechanism to combat OC development and progression, ultimately paid impressive dividends with the 2014 FDA approval of the PARP inhibitor olaparib. Given the significant number of clinical and research questions created by this recent introduction and the rapidly expanding database surrounding PARP inhibition in general, it is clear that additional educational resources are needed to keep practicing clinicians up to date and informed. To that end, this special *RTP On Demand* program uses one-on-one discussion with leading investigators in the field to assist practicing clinicians with the formulation of up-to-date management strategies.

LEARNING OBJECTIVES

- Use available guidelines and consensus statements to develop an evidence-based algorithm for conducting genetic screening for patients with OC.
- Understand the rationale for the investigation of PARP inhibition as monotherapy or in combination with other novel agents for patients with BRCA mutation-positive and BRCA wild-type advanced OC, and use this information to inform protocol and nonresearch treatment options for these individuals.
- Appreciate the recent approval of olaparib for patients with highly refractory advanced OC, and appropriately integrate this agent into the clinical management of such cases.
- Educate patients about the potential side effects associated with approved and investigational PARP inhibitors, and provide preventive and emergent strategies to reduce or ameliorate these toxicities.

ACCREDITATION STATEMENT

Research To Practice is accredited by the Accreditation Council for Continuing Medical Education to provide continuing medical education for physicians.

CREDIT DESIGNATION STATEMENT

Research To Practice designates this enduring material for a maximum of 1.0 *AMA PRA Category 1 Credit™*. Physicians should claim only the credit commensurate with the extent of their participation in the activity.

AMERICAN BOARD OF INTERNAL MEDICINE (ABIM) — MAINTENANCE OF CERTIFICATION (MOC)

Successful completion of this CME activity enables the participant to earn up to 1.0 MOC point in the American Board of Internal Medicine's (ABIM) Maintenance of Certification (MOC) program. Participants will earn MOC points equivalent to the amount of CME credits claimed for the activity. It is the CME activity provider's responsibility to submit participant completion information to ACCME for the purpose of granting ABIM MOC credit.

Please note, this program has been specifically designed for the following ABIM specialty: **medical oncology**.

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HOW TO USE THIS CME ACTIVITY

This CME activity consists of a video component. To receive credit, the participant should watch the video, complete the Post-test with a score of 80% or better and fill out the Educational Assessment and Credit Form located at **ResearchToPractice.com/RTPODOvarian116/Video/CME**.

CONTENT VALIDATION AND DISCLOSURES

Research To Practice (RTP) is committed to providing its participants with high-quality, unbiased and state-of-the-art education. We assess conflicts of interest with faculty, planners and managers of CME activities. Conflicts of interest are identified and resolved through a conflict of interest resolution process. In addition, all activity content is reviewed by both a member of the RTP scientific staff and an external, independent physician reviewer for fair balance, scientific objectivity of studies referenced and patient care recommendations.

FACULTY — The following faculty (and their spouses/partners) reported relevant conflicts of interest, which have been resolved through a conflict of interest resolution process:

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Hardware/Software Requirements:
A high-speed Internet connection
A monitor set to 1280 x 1024 pixels or more
Internet Explorer 7 or later, Firefox 3.0 or later, Chrome, Safari 3.0 or later
Adobe Flash Player 10.2 plug-in or later
Adobe Acrobat Reader
(Optional) Sound card and speakers for audio

Last review date: January 2017

Expiration date: January 2018

Select Publications

A phase 2, open-label, single-arm study to evaluate the safety and efficacy of niraparib in patients with advanced, relapsed, high-grade serous epithelial ovarian, fallopian tube, or primary peritoneal cancer who have received three or four previous chemotherapy regimens. NCT02354586

A phase 2, open-label study of rucaparib in patients with platinum-sensitive, relapsed, high-grade epithelial ovarian, fallopian tube, or primary peritoneal cancer (ARIEL2). NCT01891344

A phase III, open label, randomised, controlled, multi-centre study to assess the efficacy and safety of olaparib monotherapy versus physician's choice single agent chemotherapy in the treatment of platinum sensitive relapsed ovarian cancer in patients carrying germline BRCA1/2 mutations. NCT02282020

A phase III randomised, double blind, placebo controlled study of olaparib maintenance monotherapy in platinum sensitive relapsed BRCA mutated ovarian cancer patients with a complete or partial response following platinum based chemotherapy. NCT01874353

Banerjee S et al. **Management of nausea and vomiting during treatment with the capsule (CAP) and tablet (TAB) formulations of the PARP inhibitor olaparib.** *Proc ECCO* 2015;**Abstract 2759**.

Helleday T. **The underlying mechanism for the PARP and BRCA synthetic lethality: Clearing up the misunderstandings.** *Mol Oncol* 2011;5(4):387-93.

Kristeleit RS et al. **Clinical activity of the poly(ADP-ribose) polymerase (PARP) inhibitor rucaparib in patients (pts) with high-grade ovarian carcinoma (HGOC) and a BRCA mutation (BRCAmut): Analysis of pooled data from Study 10 (parts 1, 2a, and 3) and ARIEL2 (parts 1 and 2).** *Proc ESMO* 2016;**Abstract 8560**.

Ledermann JA et al. **Overall survival in patients with platinum-sensitive recurrent serous ovarian cancer receiving olaparib maintenance monotherapy: An updated analysis from a randomised, placebo-controlled, double-blind, phase 2 trial.** *Lancet Oncol* 2016;17(11):1579-89.

Ledermann J et al. **Olaparib maintenance therapy in platinum-sensitive relapsed ovarian cancer: A preplanned retrospective analysis of outcomes by BRCA status in a randomised phase 2 trial.** *N Engl J Med* 2012;366(15):1382-92.

McNeish IA et al. **Results of ARIEL2: A Phase 2 trial to prospectively identify ovarian cancer patients likely to respond to rucaparib using tumor genetic analysis.** *Proc ASCO* 2015;**Abstract 5508**.

Mirza MR et al. **A randomized, double-blind phase 3 trial of maintenance therapy with niraparib vs placebo in patients with platinum-sensitive recurrent ovarian cancer (ENGOT-OV16/NOVA trial).** *Proc ESMO* 2016;**Abstract LBA3_PR**.

Mirza MR et al. **Niraparib maintenance therapy in platinum-sensitive, recurrent ovarian cancer.** *N Engl J Med* 2016;375(22):2154-64.

Phase 3 study of rucaparib as switch maintenance after platinum in relapsed high grade serous and endometrioid ovarian cancer (ARIEL3). NCT01968213